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EXAMINER	
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/785,617	LOOK, CHRISTOPHER M.	
	Examiner	Art Unit	
	Wai Lun Leung	2613	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *23 July 2007*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-26* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-26* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☐ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1, and 3-5 are rejected under 35 U.S.C. 102(b) as being anticipated by **Li et al.** *(US005515361A).*

Regarding to claim 1, **Li** discloses a method to verify connectivity between an optical transceiver *(station 1, fig 2)* and a wavelength switch module (WSM) *(301, fig 2)*, the method comprising: sending a first optical signal from the optical transceiver to the WSM *(signals in uplink 206, fig 2)*; checking a second optical signal *(signals in downlink 207, fig 2)* received by the optical transceiver after sending the first optical signal and determining whether the second optical signal corresponds to the first optical signal *(col 3, ln 61-66 "The station then periodically sends light pulses... then receive its own pulses and decide that the link is up")*; and , putting an identification *(periodic pulses, col 3, ln 61-62)* into the first optical signal to send with the first optical signal to the WSM.

As to claim 3, **Li** further discloses the method of claim 1, wherein determining whether the second optical signal corresponds to the first optical signal comprises checking whether the second optical signal includes the identification *(col 3, ln 62-66)*.

As to claim 4, **Li** further discloses the method of claim 3, further comprising sending an error message if the second optical signal does not include the identification *(col 3, ln 51-57,*

where, when the down-link 207 fails, i.e. the second optical signal does not include the identification, the monitor photodiode 203 sends an error message to turn off the transmitter 201).

As to claims 5, **Li** further discloses wherein the first optical signal enters the WSM at an input port of the WSM *(input port of 1x2 switch, fig 2)*, passes through a channel *(306, fig 2)* of the WSM, and exits through an output port of the WSM *(output port connecting to downlink 207, fig 2)*, the output port being coupled to the input port via the channel *(306, fig 2)* and having a one-to-one correspondence with the input port *(switch 301 has 3 input ports and 3 output ports, fig 2)*.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

The factual inquiries set forth in *Graham* **v.** *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

Furthermore, the key to supporting any rejection under 35 U.S.C. 103 is the clear articulation of the reason(s) why the claimed invention would have been obvious. The Supreme Court in *KSR International Co. v. Teleflex Inc.* note that the analysis supporting a rejection under 35

U.S.C. 103 should be made explicit. The Court quoting *In re Kahn* 441 F.3d977,988,78 USPQ2d1329,1336(Fed.Cir.2006) stated that "[R]ejections on obviousness cannot be sustained by mere conclusory statements; instead, there must be some articulated reasoning with some rational underpinning to support the legal conclusion of obviousness."

4. Claims 6-8, and 23-25 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Li et al.** *(US005515361A)*, in view of **Lahat et al.** *(US006417944B1)*.

Regarding claims 6 and 23, **Li** discloses the method in accordance to claim 5 as discussed above. **Li** does not disclose expressly for the method to further comprising: causing a processor to look up a wavelength designated to the channel; and checking whether the optical transceiver is at the wavelength designated to the channel. **Lahat**, from the same field of endeavor, teaches a method comprising: causing a processor *(32, fig 2)* to look up a wavelength designated to the channel *(col 8, ln 4-7)*; and checking whether the optical transceiver is at the wavelength designated to the channel *(col 8, ln 7-8)*. Therefore, it would have been obvious for a person of ordinary skill in the art at the time of invention to use **Lahat's** processor to look up a wavelength designated to **Li's** channel; and checking whether **Li's** optical transceiver is at the wavelength designated to the channel. The motivation for doing so would have been to be able to dynamically assign different wavelengths to the transceiver using a processor with a look up table such as that of **Lahat's**.

Furthermore, regarding claims 6 and 23, as presented above with a finding that at the time of the invention, there had been a recognized problem or need in the art ***(Lahat, (col 1, ln 12-24))***, including a design need or market pressure to solve a problem; a finding that there had been a finite number of identified predictable potential solutions to the recognized need or problem ***(Lahat, (col 1, ln 25-col 4, ln 15))*** ; and a finding that one of ordinary skill in the art could have pursued the known potential solutions with a reasonable expectation of success

*(**Lahat**, (col 4, ln 17-54))* , and additional findings based on the *Graham* factual inquiries as presented above. Therefore, the rational to support a conclusion that the claim would have been obvious has been clearly articulated in that "a person of ordinary skill has good reason to pursue the known options within his or her technical grasp. If this leads to the anticipated success, it is likely the product not of innovation but of ordinary skill and common sense. In that instance the fact that a combination was obvious to try might show that it was obvious under 103." In *KSR*, 550 U.S. 82 USPQ 2d at 1397.

As to claims 7 and 24, **Lahat** further teaches tuning a light source of the optical transceiver to the wavelength designated to the channel if the optical transceiver is not at the wavelength designated to the channel *(col 8, ln 23-25)*.

As to claims 8 and 25, **Lahat** further discloses wherein causing the processor to look up the wavelength comprises sending an interrupt to the processor upon detection of the first optical signal at the input port of the WSM *(col 10, ln 53-61; 140, fig 7)*.

5. Claims 9-11 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Lahat et al.** *(US006417944B1)*, in view of **Koren et al.** *(US006826368B1)*.

Regarding claim 9, **Lahat** discloses a machine-accessible medium *(memory 34, fig 2)* that provides instructions that, if executed by a processor, will cause the processor to perform operations *(fig 7)* comprising: in response to an interrupt *(scheduler checks for collision, col 9, ln 16-22)* from a wavelength switch module *(interface card 60, fig 3; col 9, ln 32-37)*, identifying an input port of the WSM that receives a first optical signal from an optical transceiver *(col 10, ln 11-20)*. **Lahat** does not disclose expressly the step of identifying the wavelength switch module. **Koren**, from the same field of endeavor, teaches identifying a wavelength switch

module *(col 6, ln 13-53, a routing table determines the network location of a particular subnetwork such as a wavelength switch module, corresponding to a particular wavelength).* Therefore, it would have been obvious for a person of ordinary skill in the art at the time of invention to identify **Lahat's** wavelength switch module in a similar manner that **Lahat's** input port of the WSM is identified, as suggested by **Koren**. The motivation for doing so would have been to quickly and easily identify the Wavelength Switch Module and an input port of the WSM by it associated wavelength.

Furthermore, it would have been obvious for a person of ordinary skill in the art at the time when the invention was made to recognize the known improvement technique such as that of **Koren's** could have applied in the same way to **Lahat's** base device and the results of quickly and easily identify the Wavelength Switch Module and an input port of the WSM by it associated wavelength would have been predictable to one of ordinary skill in the art. Therefore, the rationale of use of known technique (**Koren's**) to improve similar methods (**Lahat's**) in the same way has been clearly articulated herein with the *Graham* inquiries and findings as presented above. *In re Nilssen* 851 F.2d 1401, 7 USPQ 2d 1500 (Fed.Cir.1988) at 1403, 7 USPQ2d at 1502, the court found "it would have been obvious to one of ordinary skill in the art to use the threshold signal produced in the USSR device to actuate a cutoff switch to render the inverter inoperative as taught by Kammiller." That is, using the known technique of a cut off switch for protecting a circuit to provide the protection desired in the inverter circuit of the USSR document would have been obvious to one of ordinary skill.

As to claim 10, **Lahat** further discloses wherein the operations further comprise: determining whether the optical transceiver has received a second optical signal after sending the first optical signal *(col 10, ln 50-52)*; and identifying a wavelength designated to a channel in the WSM corresponding to the input port *(col 10, ln 43-48)*.

As to claim 11, **Lahat** further discloses wherein the operations further comprise: tuning a light source of the optical transceiver to the designated wavelength if the light source is not at the designated wavelength *(col 10, ln 11-20; col 10, ln 43-50)*.

6. Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over **Lahat et al.** *(US006417944B1)*, in view of **Koren et al.** *(US006826368B1)*, as applied to claim 10 above, and further in view of **Lyu et al.** *(US006369926B1)*.

Regarding claim 12, **the combination of Lahat and Koren** discloses the limitations in accordance to claim 10 as discussed above. **It** does not disclose expressly wherein the operations further comprise: sending an error message if the light source is not at the designated wavelength. **Lyu**, from the same field of endeavor, teaches sending an error message if the light source is not at the designated wavelength *(col 3, ln 51-59)*. Therefore, it would have been obvious for a person of ordinary skill in the art at the time of invention to send an error message if the light source is not at the designated wavelength in **the combination of Lahat and Koren**'s system as taught by **Lyu**. The motivation for doing so would have been to decrease signal to noise ratio by using error signals to reduce wavelength variation *(Lyu, col 3, ln 19-26)*.

7. Claims 13, 15-18, and 20-22 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Li et al.** *(US005515361A)*, in view of **Tsao et al.** *(US006504969B1)*.

Regarding claims 13, 15, 18 and 20, **Li** discloses a system comprising: an optical network including a plurality of optical fibers *(fig 2 shows a portion of a STAR network, coupling Station 1 with a switch over uplink 206 and down link 207, and station 2 via a star coupler)*; and a first optical network node *(station 1, along with switch 301, fig 2)*, coupled to the optical network *(via star coupler 204)*, the first optical network node comprising: a wavelength switch module (WSM) *(301, fig 2)*; an optical transceiver *(station 1, fig 2)*, detachably coupled to the WSM *(as shown in fig 2)*, to send a first optical signal to the WSM *(col 3, ln 61-62)* and to detect a second optical signal received from the WSM after sending the first optical signal *(col 3, ln 62-66)*; and a set of one or more processors *(finite state machine 500, fig 4)* to automatically determine whether the second optical signal corresponds to the first optical signal in response to an interrupt from each of the WSM and the optical transceiver *(col 4, ln 18-48)*. **Li** further discloses wherein the optical transceiver put an identification into the first optical signal to send with the first optical signal to the WSM *(periodic light pulses are sent to switch 301, col 3, ln 61-62)* and a check whether the second optical signal includes the identification *(the station receives its own pulse, col 3, ln 63-66)*. **Li** does not disclose expressly having an encoder to put the identification onto the first optical signa, and having a decoder to check for the identification. **Tsao**, from the same field of endeavor, teaches an encoder for outputting an identification pulse *(col 3, ln 57-60)*, and a decoder for checking the pulses remaining in the optical loop *(col 4, ln 31-58)*. Therefore, it would have been obvious for a person of ordinary skill in the art at the time of invention to use an encoder and decoder onto **Li**'s system to generate and detect the identification pulses as taught by **Tsao**. The motivation for doing so would have been to

implement encoding and decoding using an easily controlled tunable means *(Tsao, col 5, ln 50-52)*.

Furthermore, it would have been obvious for a person of ordinary skill in the art at the time of invention to recognized that applying a known technique such as that of **Tsao's** onto **Li's** base device/method/system upon which the claimed invention can be seen as an "improvement" would have yielded predictable results and resulted in an improvement system, since **Tsao's** teaching is capable of enhancing performance of producing and encoded identification pulses using a controlled tunable means.

Therefore, the rationale of applying a known technique (**Tsao's**) to a known device/method/system (**Li's**) ready for improvement to yield predictable results has been clearly articulated herein with the *Graham* inquiries and findings as presented above. In *Dann v. Johnston* 525 U.S. 219, 189 USPQ257 (1976) The Court held that "[t]he gap between the prior art and respondent's system is simply not so great as to render the system nonobvious to one reasonable skilled in the art."

As to claims 16 and 21, **Li** further discloses wherein the first optical signal enters the WSM at an input port of the WSM *(input port of 1x2 switch, fig 2)*, passes through a channel *(306, fig 2)* of the WSM, and exits through an output port of the WSM *(output port connecting to downlink 207, fig 2)*, the output port being coupled to the input port via the channel *(306, fig 2)* and having a one-to-one correspondence with the input port *(switch 301 has 3 input ports and 3 output ports, fig 2)*.

As to claims 17 and 22, **Li** further discloses wherein the optical transceiver comprises a light source, which is tunable to a wavelength designated to the channel *(col 4, ln 4-26)*.

8. Claim 26 rejected under 35 U.S.C. 103(a) as being unpatentable over **Kinoshita et al.** *(US007076163B2)*, in view of **Li et al.** *(US005515361A); and further in view of* **Lahat et al.** *(US006417944B1).*

Regarding claim 26, **Kinoshita** discloses a method for commissioning in an optical network node *(201, fig 8; fig 9)* comprising: transmitting an optical signal of a given wavelength from an optical transceiver *(270, fig 9)* that is in the optical network node, wherein a laser *(col 6, ln 54-59 describes a laser can be set to transmit a specified wavelength)* of said optical transceiver is connected to one of a plurality of add ports *(312, fig 9)* on one of a plurality of wavelength switch modules (WSMs) *(WSMs includes 226, 222, 220, and 224, fig 9)* in said optical network node, wherein a light receiver *(268, fig 9)* of said optical transceiver is connected to a corresponding one of a plurality of drop ports *(314, fig 9)* on the one of the plurality of WSMs, wherein at least some of said plurality of WSMs handle different wavelengths than others *(col 7, ln 25-29; WSM for clockwise handles 1530.33nm, for example, the WSM for counter-clockwise handles 1531.12nm)* and this is tracked in configuration information *(col 15, ln 53-59)*, and detecting the optical signal in the one of the plurality of WSMs *(col 15, ln 48-52)*; based on said detecting of the optical signal, determining the wavelength handled by the one of the plurality of WSMs from the configuration information *(col 15, ln 53-65).* **Kinoshita** does not disclose expressly wherein a default configuration for the plurality of WSMs is to pass through a received optical signal from add port to corresponding drop port; detecting the optical signal at the optical transceiver; correlating said detectings to determine that the optical transceiver is connected to the one of the plurality of WSMs; and determining if the wavelength of the optical signal matches the wavelength handled by the one of the plurality of WSMs.

Li, from the same field of endeavor, teaches a default configuration for a WSM to pass through *(306, fig 2)* a received optical signal from add port *(206, fig 2)* to corresponding drop port *(207, fig 2)*; detecting the optical signal at the optical transceiver *(203, fig 2)*; correlating said detectings to determine that the optical transceiver is connected to the WSM *(col 3, ln 61-66)*; and determining if the wavelength of the optical signal matches the wavelength handled by the WSM *(col 4, ln 21-31)*. Therefore, it would have been obvious for a person of ordinary skill in the art at the time of invention to pass through a received optical signal from add port to corresponding drop port as a default configuration; detecting the optical signal at the optical transceiver; correlating said detectings to determine that the optical transceiver is connected to the one of the plurality of WSMs; and determining if the wavelength of the optical signal matches the wavelength handled by the one of the plurality of WSMs onto **Kinoshita**'s system as taught by **Li**. The motivation for doing so would have been to be able to continuously monitor connection failure.

Furthermore, it would have been obvious for a person of ordinary skill in the art at the time when the invention was made to recognize the known improvement technique such as that of **Li's** could have applied in the same way to **Kinoshita's** base device and the results of being able to continuously monitor connection failure would have been predictable to one of ordinary skill in the art. Therefore, the rationale of use of known technique (**Li's**) to improve similar methods (**Kinoshita's**) in the same way has been clearly articulated herein with the *Graham* inquiries and findings as presented above. *In re Nilssen* 851 F.2d 1401, 7 USPQ 2d 1500 (Fed.Cir.1988) at 1403, 7 USPQ2d at 1502, the court found "it would have been obvious to one of ordinary skill in the art to use the threshold signal produced in the USSR device to actuate a

cutoff switch to render the inverter inoperative as taught by Kammiller." That is, using the known technique of a cut off switch for protecting a circuit to provide the protection desired in the inverter circuit of the USSR document would have been obvious to one of ordinary skill.

The combination of Kinoshita and Li does not disclose expressly wherein wavelengths handled by each of said plurality of WSMs are tracked in configuration information of a corresponding WSM. **Lahat**, from the same field of endeavor, teaches a system wherein wavelengths handled by each of a plurality of WSMs are tracked in configuration information of a corresponding WSM *(col 7, ln 60-col 8, ln 14)* . Therefore, it would have been obvious for a person of ordinary skill in the art at the time of invention to track configuration information of each wavelength in **the combination of Kinoshita and Li**'s system as suggested by **Lahat**. The motivation for doing so would have been to enhance flexability, speed, or accuracy by tracking wavelength configuration information *(Lahat, (col 8, ln 15-25))*.

Furthermore, it would have been obvious for a person of ordinary skill in the art at the time of invention to recognized that applying a known technique such as that of **Lahat's** onto **the combination of Kinoshita and Li's** base device/method/system upon which the claimed invention can be seen as an "improvement" would have yielded predictable results and resulted in an improvement system, since **Lahat's** teaching is capable of enhancing performance of the optical network by tracking wavelength configuration information.

Therefore, the rationale of applying a known technique (**Lahat's**) to a known device/method/system (**the combination of Kinoshita and Li's**) ready for improvement to yield predictable results has been clearly articulated herein with the *Graham* inquiries and findings as presented above. In *Dann v. Johnston* 525 U.S. 219, 189 USPQ257 (1976) The Court held that

"[t]he gap between the prior art and respondent's system is simply not so great as to render the system nonobvious to one reasonable skilled in the art."

9. Claims 2, 14, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over **Li et al.** *(US005515361A)*, in view of **Tsao et al.** *(US006504969B1)*, and further in view of **Kinoshita et al.** *(US007076163B2)*.

Regarding claims 2, 14, and 19, **the combination of Li and Tsao** discloses the limitations in accordance to claims 1, 13, and 18 as discussed above. **It** does not disclose expressly wherein determining whether the second optical signal corresponds to the first optical signal comprises: varying power of the first optical signal before the first optical signal exits the WSM; and measuring the second optical signal to determine whether power of the second optical signal changes in response to the varying of the power of the first optical signal. **Kinoshita**, from the same field of endeavor, teaches varying power of the first optical signal before the first optical signal exits the WSM *(using amplifiers 326 and 328, fig 9; col 13, ln 15-21)*; and measuring a second optical signal to determine whether power of the second optical signal changes in response to the varying of the power of the first optical signal *(col 13, ln 32-47, EMS 290 performs monitoring, failure detection, protection switching and loopback or localized testing functionality; col 4, ln 39-42 indicated that such monitoring includes wavelengths, power, and quality parameters)*. Therefore, it would have been obvious for a person of ordinary skill in the art at the time of invention to determine whether the second optical signal corresponds to the first optical signal by varying power of the first optical signal before the first optical signal exits the WSM; and measuring the second optical signal to determine whether power of the second

optical signal changes in response to the varying of the power of the first optical signal in **the combination of Li and Tsao**'s system as suggested by **Kinoshita**. The motivation for doing so would have been to be able to evaluate signal power distortion over the transmission link while checking for transmission link integrity.

Furthermore, it would have been obvious for a person of ordinary skill in the art at the time of invention to recognized that applying a known technique such as that of **Kinoshita's** onto **the combination of Li and Tsao's** base device/method/system upon which the claimed invention can be seen as an "improvement" would have yielded predictable results and resulted in an improvement system, since **Kinoshita's** teaching is capable of enhancing performance of transmission link integrity.

Therefore, the rationale of applying a known technique (**Kinoshita's**) to a known device/method/system (**the combination of Li and Tsao's**) ready for improvement to yield predictable results has been clearly articulated herein with the *Graham* inquiries and findings as presented above. In *Dann v. Johnston* 525 U.S. 219, 189 USPQ257 (1976) The Court held that "[t]he gap between the prior art and respondent's system is simply not so great as to render the system nonobvious to one reasonable skilled in the art."

Response to Arguments

10. Applicant's arguments with respect to claims 13-22, and 26 have been considered but are moot in view of the new ground(s) of rejection.

11. Applicant's arguments filed 7/23/2007 with respect to claims 1-12, and 23-25 have been fully considered but they are not persuasive.

Applicant argues, with respect to claims 1, 2, 13, 14, 18, 19, 3-5, 16-17, and 21-22 that "Li does not disclose that such periodic pulsing of light is an identification, nor does Li suggest to identify anything using such periodic pulsing of light."

Applicant is reminded that during patent examination, USPTO personnel are to give claims their broadest reasonable interpretation in light of the supporting disclosure. *In re Morris*, 127 F.3d 1048, 1054-55, 44 USPQ2d 1023, 1027-28 (Fed. Cir. 1997). Limitations appearing in the specification but not recited in the claim should not be read into the claim. *E-Pass Techs., Inc. v. 3Com Corp.*, 343 F.3d 1364, 1369, 67 USPQ2d 1947, 1950 (Fed. Cir. 2003) (claims must be interpreted "in view of the specification" without importing limitations from the specification into the claims unnecessarily). *In re Prater*, 415 F.2d 1393, 1404-05, 162 USPQ 541, 550-551 (CCPA 1969). See also *In re Zletz*, 893 F.2d 319, 321-22, 13 USPQ2d 1320,1322 (Fed. Cir. 1989) ("During patent examination the pending claims must be interpreted as broadly as their terms reasonably allow.... The reason is simply that during patent prosecution when claims can be amended, ambiguities should be recognized, scope and breadth of language explored, and clarification imposed.... An essential purpose of patent examination is to fashion claims that are precise, clear, correct, and unambiguous. Only in this way can uncertainties of claim scope be removed, as much as possible, during the administrative process."). see **MPEP § 2106**

Li teaches that such period pulsing of light identify a situation in which a link failure is repaired *(col 3, 61-col 4, ln 3)* Li also teaches that "the station can then receive its own pulses and decide that the link is up" and therefore the pulses identify the station itself since it recognizes its own pulses.

Applicant argues, with respect to claims 6-8, and 23-25 that one of ordinary skill in the art would not have been motivated to modify Li with Lahat as proposed. Applicant also argues, with respect to claims 15 and 20 that one of ordinary skill in the art would not have been motivated to modify Li with Taso to include an encoder to put an identification in the optical signal. *In KSR Int'l Co. v. Teleflex, Inc.*, the Supreme Court rejected a rigid application of the "teaching, suggestion, or motivation" (TSM) test, which required a showing of some teaching, suggestion, or motivation in the prior art that would lead one of ordinary skill in the art to combine the prior art elements in the manner claimed in the application or patent before holding the claimed subject matter to be obvious.

As stated in 103 rejections above, with respect to claims 6-8, and 23-25, with a finding that at the time of the invention, there had been a recognized problem or need in the art ***(Lahat, (col 1, ln 12-24))***, including a design need or market pressure to solve a problem; a finding that there had been a finite number of identified predictable potential solutions to the recognized need or problem ***(Lahat, (col 1, ln 25-col 4, ln 15))*** ; and a finding that one of ordinary skill in the art could have pursued the known potential solutions with a reasonable expectation of success ***(Lahat, (col 4, ln 17-54))*** , and additional findings based on the *Graham* factual inquiries as presented above. Therefore, the rational to support a conclusion that the claim would have been obvious has been clearly articulated in that "a person of ordinary skill has good reason to pursue the known options within his or her technical grasp. If this leads to the anticipated success, it is likely the product not of innovation but of ordinary skill and common sense. In that instance the fact that a combination was obvious to try might show that it was obvious under 103." In *KSR*, 550 U.S. 82 USPQ 2d at 1397.

With respect to claims 15 and 20, it would have been obvious for a person of ordinary skill in the art at the time of invention to recognized that applying a known technique such as that of **Tsao's** onto **Li's** base device/method/system upon which the claimed invention can be seen as an "improvement" would have yielded predictable results and resulted in an improvement system, since **Tsao's** teaching is capable of enhancing performance of producing and encoded identification pulses using a controlled tunable means. Therefore, the rationale of applying a known technique (**Tsao's**) to a known device/method/system (**Li's**) ready for improvement to yield predictable results has been clearly articulated herein with the *Graham* inquiries and findings as presented above. In *Dann v. Johnston* 525 U.S. 219, 189 USPQ257 (1976) The Court held that "[t]he gap between the prior art and respondent's system is simply not so great as to render the system nonobvious to one reasonable skilled in the art."

Applicant argues, with respect to claims 9-12 that Lahat fails to disclose in response to an interrupt from a wavelength switch module, identifying an input port of the WSM that receives a first optical signal from an optical transceiver. However, Lahat teaches "the scheduler checks for a collision before sending any data", and "the interface module assigned that particular wavelength will pass and process the data", and "If a single scheduler is used to service more than one interface module, the scheduler makes sure not to set two or more tunable optical transmitters to the same wavelength.", and "the scheduler determines the corresponding wavelength and configures the tunable optical transmitter and tunable optical sense unit in accordance thereof." *(col 9-10) Therefore, Lahat's scheduler in deed response to an interrupt from a wavelength switch module such as a collusion, and in deed does identify an input port of*

the WSM that receives a first optical signal from an optical transceiver since it keeps tracks of all wavelengths passing through all modules.

Conclusion

12. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Applicant is advised of Claims and Continuations Rules change effective November 1, 2007. Information on the new rules is available at http://www.uspto.gov.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Wai Lun Leung whose telephone number is (571) 272-5504. The examiner can normally be reached on 11:30am-9:00pm Mon-Thur.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jason Chan can be reached on (571) 272-3022. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

DWL
September 13, 2007

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